



# RESEARCH ON DEVELOPMENT AND IMPLEMENTATION OF NATIONAL BIODIVERSITY STRATEGY AND ACTION PLANS (NBSAPS) TOWARD REALIZATION OF SOCIETIES IN HARMONY WITH NATURE

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CBD SBI-2 Side Event 2440: Mainstreaming Biodiversity in Production Landscapes and Seascapes: Integrated Approaches in Design and Implementation of National Biodiversity Strategies and Action Plans (NBSAPs)



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# Background of Research

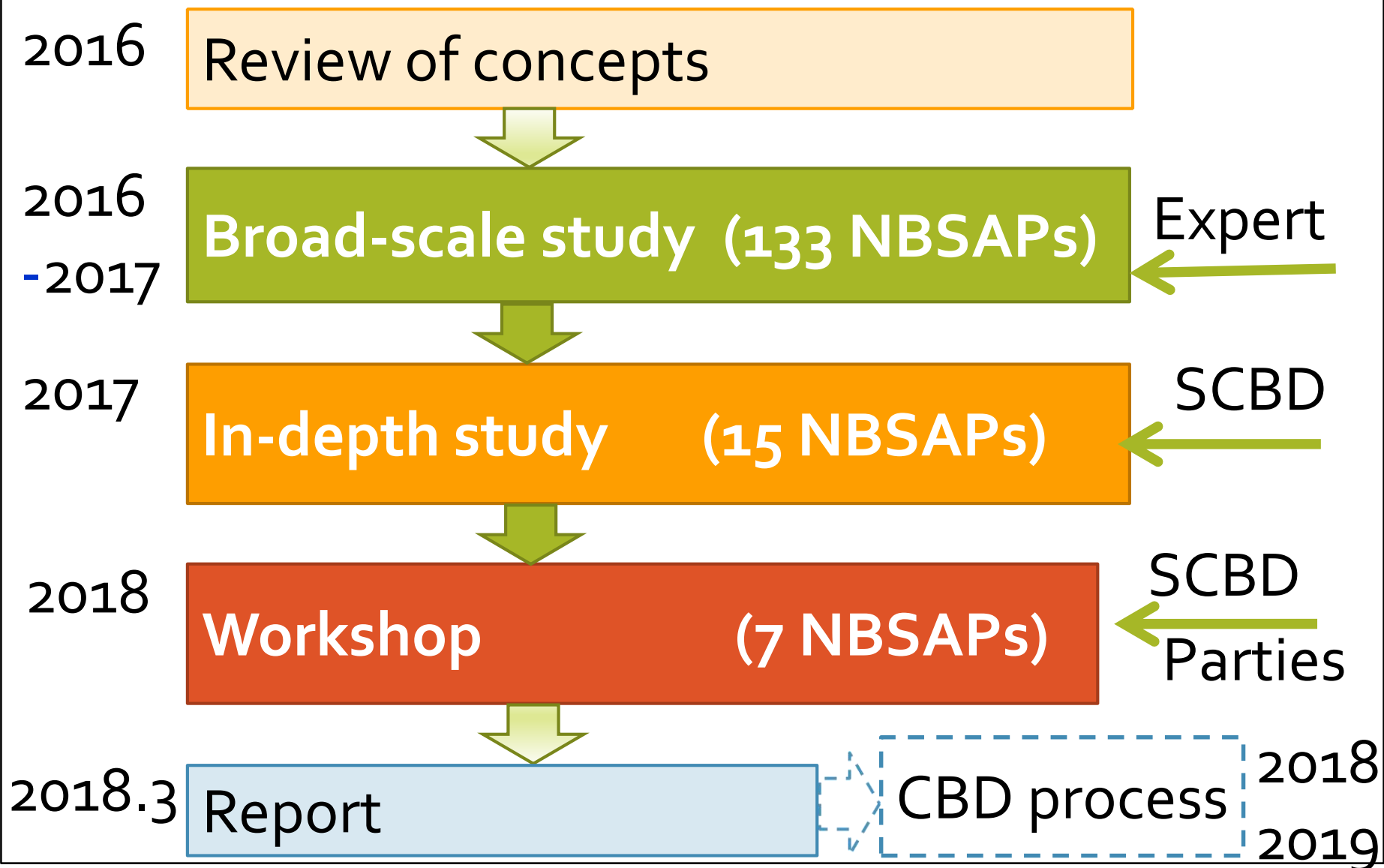
- COP 13: **Mainstreaming of biodiversity into sectors** including agriculture, forestry, fisheries and tourism etc.
- ***Integrated approaches in production landscapes and seascapes***, include socio-economic aspects, are shaped by high levels of human intervention involving both productive, cultural, aesthetic, or educational activities
- Expected to **contribute to mainstreaming of biodiversity** into relevant production sectors and to **achieving many of the Aichi Biodiversity Targets**.
- Can help Parties **involve relevant ministries, agencies and stakeholders** to mainstream biodiversity, and **capture existing measures** under their NBSAPs implementation

# Research Objectives

- How “*integrated approaches in production landscapes (and seascapes)*” are being **incorporated into and implemented under NBSAPs** ?
- How they are contributing to the **achievement of the Aichi Biodiversity Targets**?
- Provide useful knowledge for future NBSAP development and implementation.



# Overview of Research



# Review of concepts

- Integrated Approaches in Production Landscapes (and Seascapes):
  - Cultural Landscapes
  - Socio-Ecological Production Landscapes (SEPLS)
  - Globally Important Agricultural Heritage Systems (GIAHS)
  - Landscape management/approach
  - Local terms related to these landscapes/approaches (e.g. *Dehesa* in Spain, *Muyong* in Philippines)...etc
- Ecosystem approach
- Mainstreaming biodiversity in other sectors

# Broad-scale study (133 NBSAPs)

## Objectives

Are the concepts related to integrated approaches in production landscapes (and seascapes) referred to in NBSAPs?

## Data set

➤ All countries' latest NBSAPs, in English, shared on the CBD website by 31 July 2016 (total number analyzed: 133).

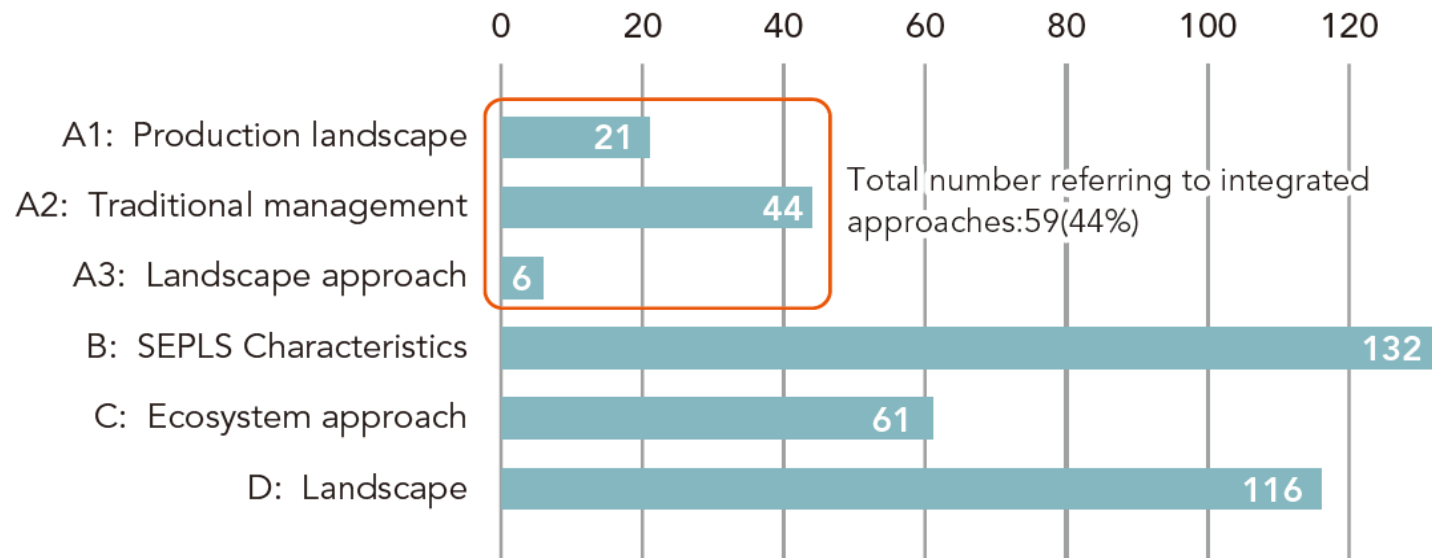
## Methodology

Text mining

Group		Code	Examples of Keywords
A: Integrated Approaches in Production Landscapes	A1: Production landscapes	*GIAHS	Globally Important Agricultural Heritage Systems, GIAHS
		*SEPLS	SEPL, SEPLS, socio-ecological production landscape, social ecological production landscape
		*Cultural landscape	Cultural landscape, biocultural landscape, high-nature-value farmland
	A2: Traditional management	*Traditional natural resource management	dehesa, ahupua'a, satoyama, muyong, community forestry, transhumance, agroforestry, homegarden, etc.
A3: Landscape approach	*Landscape approach	Landscape approach, integrated landscape management	
B: SEPLS Characteristics		*Dynamic <b>mosaics of habitats</b> and land and sea uses	dynamic mosaic, mosaic land use, heterogeneous landscape
		*Harmonious interactions between <b>people and nature</b> maintains biodiversity	human influenced landscape, society, harmony with nature, etc.
		*Providing humans with the <b>goods and services</b> in a sustainable manner	sustainable natural resource use, etc.
		*Be deeply linked to local <b>culture and knowledge</b>	local knowledge, local culture, traditional knowledge, etc.
C: Ecosystem approach		*Ecosystem approach	Ecosystem approach
D: Landscape		*Landscape	landscape
		*Seascape	seascape

# Broad-scale study Results

Number of NBSAPs referring to relevant concepts  
(133 NBSAPs)



- **About half (44%)** referred to the production landscapes concepts
- **Almost all (132/133)** referred to characteristics related to production landscapes



# In-depth study

## Objectives

What measures taken to implement the concepts in the NBSAPs?

## Data Set

**15 NBSAPs and National Reports**, that included the concepts related to the integrated approaches in production landscapes

Ethiopia (2016, v2), Ghana (2002, v1), Namibia (2015, v2), South Africa (2016, v2), Colombia (2012, v2), Dominica (2014, v2), Cambodia (2016, v2), Japan (2013, v5), Jordan (2015, v2), Nepal (2014, v2), Estonia (2014, v2), Greece (2014, v1), Switzerland (2012, v2), United Kingdom (2011, v3), Fiji (1995, v1)

# In-depth study (NBSAPs)

## Interrelationship between Integrated approaches in production landscapes (A) and Biodiversity mainstreaming (BM)

- Both concepts are well connected
- **A in BM: 48%** (251/561); **BM in A: 74%** (251/341)

Group A: Integrated approaches in production landscapes (and seascapes)

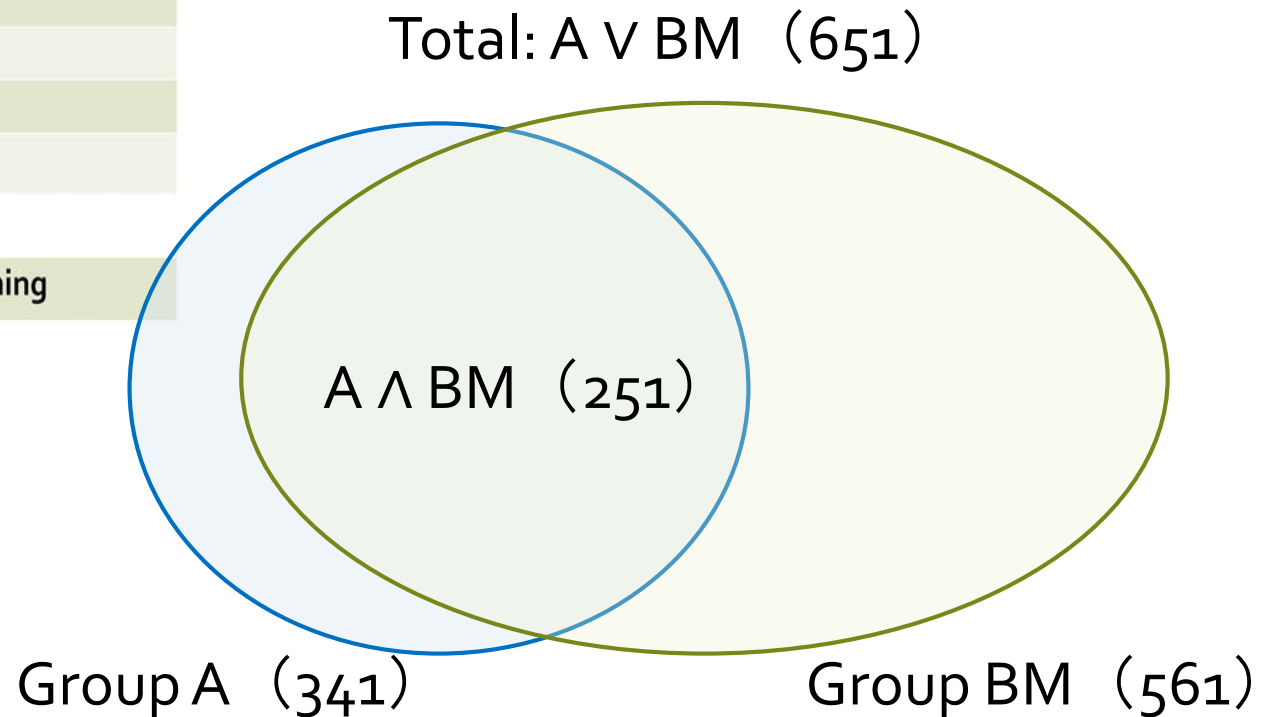
A1: Production landscapes

A2: Traditional management

A3: Landscape approach



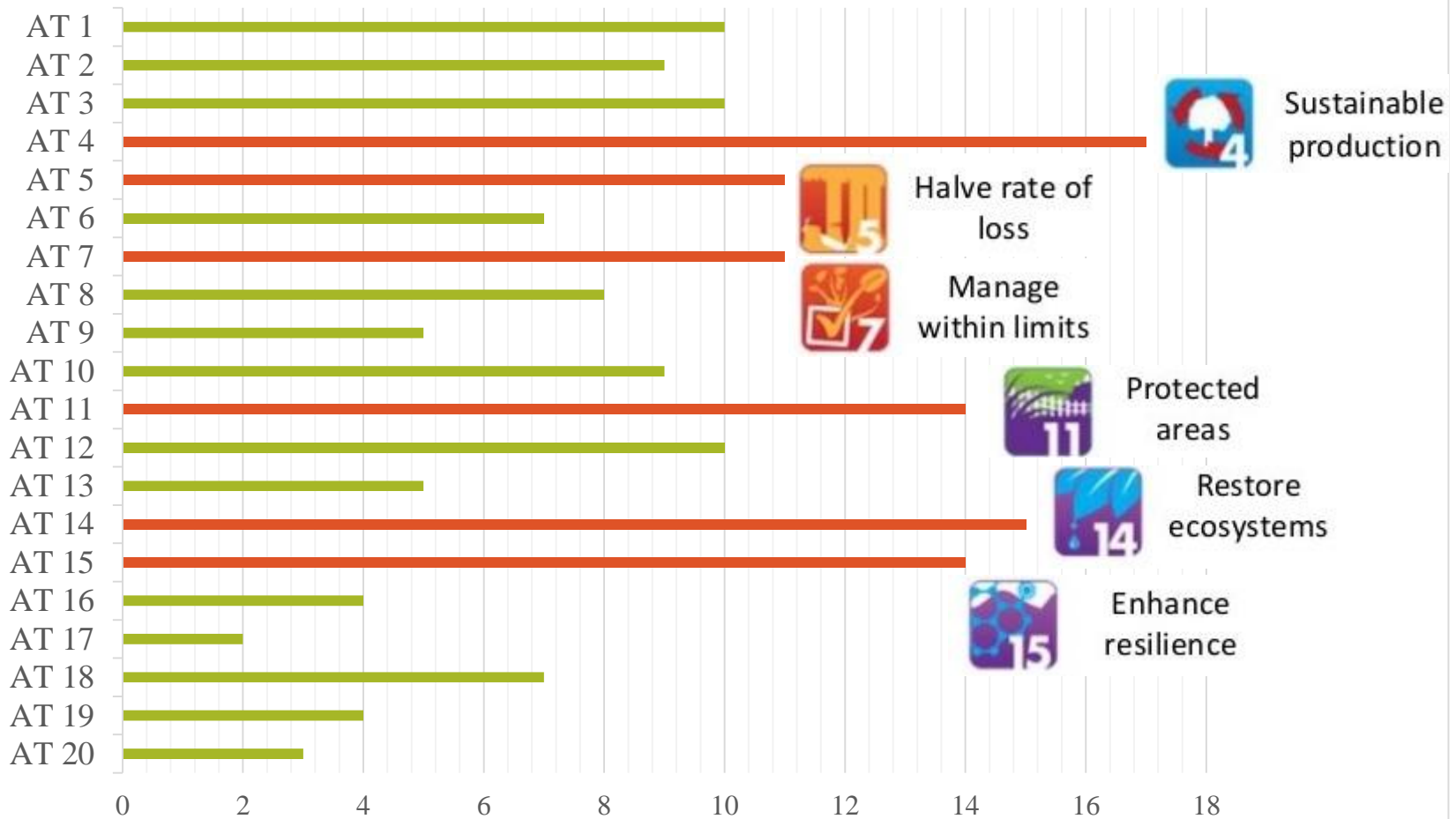
Group BM: Biodiversity mainstreaming



# In-depth study (NBSAPs)

Number of descriptions related to Group A that were found to be related to the Aichi Biodiversity Targets in the NBSAPs

N=155



Relates most to achieving Aichi Biodiversity Targets **4, 14, 15, 11, 5, & 7.**

# In-depth study (National Reports )

- Trends in the NRs concurred mostly with the results of NBSAPs study, but differed in:
  - Better co-occurrence with Biodiversity mainstreaming,
  - Less references to the importance of biodiversity and ecosystem services,
  - More categories of “projects”,
  - Higher references to the Aichi Biodiversity Targets.

# Key Research Findings

- **Multiple concepts used in NBSAPs;**  
“Socio-Ecological Production Landscapes and Seascapes” (SEPLS), “cultural landscapes”, “landscape approaches”, and related local terms.
- These concepts were;
  - 1) referred to in about half of the NBSAPs,
  - 2) well described in the “strategies”, “targets”, and “action plan” chapters,
  - 3) co-occurred with Biodiversity Mainstreaming,
  - 4) well related to ecosystem services,
  - 5) contributing the most to achieving Aichi Biodiversity Targets 4, 14, 15, 11, 5, and 7.

# Workshop (7 NBSAPs)

**16-17 January 2018, UNU (Tokyo, Japan)**

## Participants:

- 2 policy experts each from 7 national governments (Cambodia, Colombia, Estonia, Ethiopia, Japan, Mexico and South Africa), SCBD, Resource persons



## Objectives:

- Examine the **effective measures of incorporation and implementation** of the concepts under NBSAPs
- Discuss contributions to achieving Aichi Biodiversity Targets

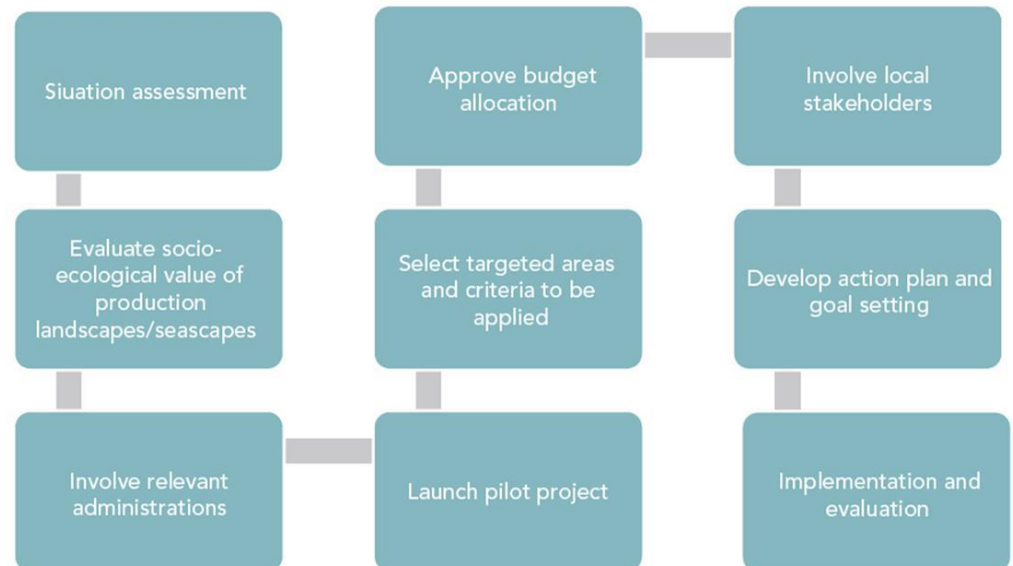


Useful knowledge for incorporating the concepts into the NBSAPs and their effective implementation.

# Workshop (Outcomes)

## A: Success factors and challenges in incorporation of integrated approaches in production landscapes and seascapes into NBSAPs

- a. Integration of cross-cutting issues among different institutions
- b. Communication and education of society including local communities
- c. Incentives at multiple levels for different stakeholders
- d. Processes of incorporation and implementation



# Workshop (Outcomes)

## B: Contributions to Aichi Biodiversity Targets

- a. **Contributions to multiple Aichi Biodiversity Targets**
  - Clearly contributes to Target **11** and relevant to Targets **4, 5, 7, and 14**.
- b. **Synchronizing goals among different policy levels**
- c. **Using technology for data capturing**
  - Technological tools such as GIS and mapping tools etc for assessment and evaluation
- d. **Better global target setting**
  - Include the concepts into global biodiversity targets post 2020.





# Workshop (Outcomes)

## C: Future steps and revision of NBSAPs

- a. Bridging institutions and establishing environmental accounting mechanisms
- b. Science-policy interface
- c. Incentives for different stakeholders' ownership
- d. Expectations from international bodies
  - Promote research, provide information platform, guidance, customized capacity building, “matchmaking” of users and providers, and facilitate collaboration



# Workshop (Outcomes)

## International

Support for national-level implementation by international bodies:

- Enabling common understanding
- Customized know-how for implementation
- Information-sharing mechanisms
- Target setting
- Facilitating trans-boundary approaches

## National

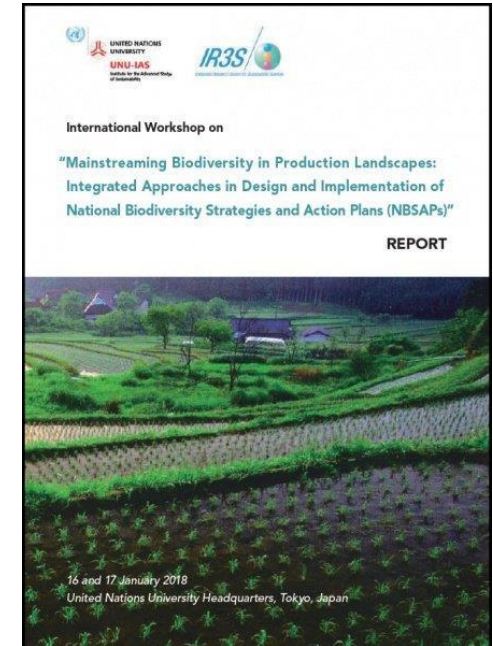
Cooperation between different ministries and sectors, and cooperation between national, sub-national and local levels:

- Concept integration
- Institutional cooperation
  - Horizontal
  - Vertical
- Communication and education
  - Involving local communities
  - Science-policy interface
  - Environmental accounting
  - Assessment and evaluation
- Incentives for stakeholders
  - Governments
  - Local communities and practitioners

# Workshop

## Workshop Recommendations

1. Encouraging and promoting the **incorporation and implementation** of these approaches in NBSAPs
2. **Mainstreaming** these approaches **globally**
3. Connecting integrated approaches in production landscapes and seascapes to **global targets**
4. Enhancing **information exchange and capacity building** for NBSAP implementation



# SBI-2 Side Event

Mainstreaming Biodiversity in Production Landscapes and Seascapes: Integrated Approaches in Design and Implementation of National Biodiversity Strategies and Action Plans (NBSAPs)

- **Share research findings and workshop outcomes**
- **Country experiences:**
  - **Estonia and Japan (workshop)**
  - **UK (in-depth study)**
- **Discussion:**
  - **Merits, needs and challenges** of incorporating and implementing these integrated approaches under NBSAPs
  - **Principles**, including **factors and processes**, for successful implementation of these approaches
  - **Recommendations for future** NBSAP development and implementation